

REMARKS

The indication of allowability of claims 12-16 is noted with appreciation. Claim 2, on which claims 12-16 depend, has been amended to recite a Markush group of the species of claims 12-16. Claims 12-16 are more limited, as they each still recite a species. Claims 2, 12-16 accordingly are in condition for allowance.

Claim 1 has been amended to remove the objected to "smooth" pivotal connection language and to now recite that there is axial discharge via a nozzle outlet that is axially aligned with the container, a limitation appearing in claim 5. The remaining rejected claims now depend on claim 1 and thus all include the axial discharge and axially aligned outlet nozzle.

Claim 1 was rejected as anticipated by Baldwin U.S. Patent No. 3,429,484, and claim 5 was rejected as obvious on Baldwin in view of Frutin U.S. Patent No. 4,826,054, cited for "axial discharge in Fig. 1."

Independent claim 1 is directed to a hand-held pressurized product dispenser that includes a container with a hand-engageable body portion, a valve mechanism at the top of the container that is movable with respect to the container to cause pressurized discharge of the product, and a valve actuation lever that is connected to the valve mechanism and extends along the container body. Claim 1 further recites that a larger displacement of the end of the lever causes a controlled, relatively smaller displacement of the valve mechanism, permitting adjustable (i.e., "throttled") delivery of the product. Claim 1 further recites that the nozzle outlet is axially aligned with the container to provide axial discharge. As noted at page 5, lines 8-18, the handle provides an ergonomic actuation for device 10, which has axial delivery.

Baldwin discloses a side delivery spray can to which U-shaped clamp 48 and an attached lever actuation mechanism have been attached by a snap connection to permit reuse with other cans. Operating element 79 (the lever) has a rough pivotal connection at "generally rectangular horizontally elongated aperture 72" (col. 2, line 51) through which upward furcation 80 and downward furcation 81 pass "to prevent withdrawal of the actuator from the clamp" (col. 2, lines 55-60). Baldwin notes that the "loose fit of the furcated end portion permits limited vertical pivotal movement of the actuator" (col. 2, lines 60-62).

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It would appear that pivotal connection at the furcated end would shift around as the lever is pivoted such that there is not a throttling of the type required by the invention claimed herein in claim 1. This does not seem to present a problem in Baldwin, as Baldwin does not mention any type of throttling action, and, would appear to be only interested in typical on/off operation of the type typically used with such spray cans.

It is also clear that Baldwin nowhere discloses or suggests the axial direction of the nozzle member as required by claim 5, as was admitted in the office action. In the office action it is stated: "It would have been obvious to one of ordinary skill in the art to provide the axial discharge as taught by Frutin on the device of Baldwin in order to have a different direction of flow out of the device which would better apply the material in certain situations." It, however, would not have been obvious to combine the teachings of Frutin with Baldwin, because they are directed to different types of discharge. The Furtin design is geared toward discharge of silicone compounds where there is concern for the product curing in the valve (col. 2, line 67- col. 3, line 3), while Baldwin is directed toward an aerosol spray head. Moreover, Furtin, like Baldwin, has on-off operation and does not permit throttling, as in the invention, such that even if one does make the combination, one does not arrive at the invention. To control the flow in Furtin, one instead rotates lock member 28 upward or downward prior to discharge and then operates it in an on/off manner.

Accordingly the subject matter of independent claim 1 is nowhere suggested by the cited references, and claim 1 is allowable under 35 USC 103(a).

The remaining rejected claims depend on claim 1 and are allowable with claim 1. These claims also add features that further distinguish the cited references. E.g., claim 3 recites that the valve actuating member moves away from the container as the lever is moved toward the container. Claim 4 recites a plastic handle with a living hinge pivot connection. Claim 6 recites that the pivot is between the valve engaging portion and the lever. Claim 8 recites a movable stop member. Claim 17 recites a product delivery member and a product holding structure.

Attached is a marked-up version of the changes being made by the current amendment.

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Applicant asks that all claims be allowed. Please apply any other charges or credits to
Deposit Account No. 06-1050.

Respectfully submitted,

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Version with markings to show changes made

In the claims:

Claims 21 and 22 have been cancelled.

Claims 1-8, 10 and 11 have been amended as follows:

1. (Twice Amended) A hand-held pressurized product dispenser comprising
a container containing product under pressure, said container having a top, a hand-engageable body portion and a bottom,
a valve mechanism at the top of said container that communicates with said container and is movable with respect to said container to cause pressurized axial discharge of said product out of said container via a nozzle outlet that is axially aligned with said container, and
a valve actuation lever that is pivotally connected to said valve mechanism via a [smooth] pivotal connection and extends along said body to a lever end such that relatively larger displacement of said lever end causes a controlled, relatively smaller displacement of said valve mechanism, permitting adjustable throttled delivery of said product.

2. (Amended) A hand-held pressurized product dispenser comprising
a container containing product under pressure, said container having a top, a hand-engageable body portion and a bottom,
a valve mechanism at the top of said container that communicates with said container and is movable with respect to said container to cause pressurized discharge of said product out of said container,
a product delivery member attached to said top of said container and having a product holding structure that is positioned with respect to said valve mechanism to receive said product, and
a valve actuating member that is connected to actuate said valve and has a hand-engageable portion that extends along said body,

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the product holding structure is selected from a porous structure having pores that receive said product, an elastomeric applicator, a sintered structure, a structure having a textured surface, and a structure having a grid surface.

3. (Amended) [A] The hand-held pressurized product dispenser of claim 1,
[comprising

a container containing product under pressure, said container having a top, a hand-engageable body portion and a bottom,

a valve mechanism at the top of said container that communicates with said container and is movable with respect to said container to cause pressurized discharge of said product out of said container, and

a valve actuating member that is connected to actuate said valve and has a hand-engageable portion that extends along said body portion,]

said valve mechanism being movable away from said container to discharge said product,
said valve actuati[ng]on [member] lever being connected to move said valve mechanism away from said container as said [hand-engageable portion] lever is moved toward said body.

4. (Amended) [A] The hand-held pressurized product dispenser of claim 1,
[comprising

a container containing product under pressure, said container having a top, a hand-engageable body portion and a bottom,

a valve mechanism at the top of said container that communicates with said container and is movable with respect to said container to cause pressurized discharge of said product out of said container, and

a valve actuating member that is connected to actuate said valve and has a hand-engageable portion that extends along said body,]

said valve actuati[ng]on [member] lever being made of plastic and being pivotally connected with respect to said container via a living hinge.

5. (Amended) The [A] hand-held pressurized product dispenser of claim 1, [comprising

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a container containing product under pressure, said container having a top, a hand-engageable body portion and a bottom,

a valve mechanism at the top of said container that communicates with said container and is movable with respect to said container to cause pressurized axial discharge of said product out of said container via a nozzle outlet that is axially aligned with said container, and

a valve actuating member that is connected to actuate said valve and has a hand-engageable portion that extends along said body,]

said valve actuati[ng]on lever [member] having a pivot end that is pivotally connected with respect to said container and also having a valve engaging portion that engages said valve mechanism and is located between said pivot end and [said] hand-engageable portion of said lever.

6. (Amended) The [A] hand-held pressurized product dispenser of claim 1,
[comprising

a container containing product under pressure, said container having a top, a hand-engageable body portion and a bottom,

a valve mechanism at the top of said container that communicates with said container and is movable with respect to said container to cause pressurized discharge of said product out of said container, and

a valve actuating member that is connected to actuate said valve and has a hand-engageable portion that extends along said body,]

said valve actuati[ng]on [member] lever having a valve engaging portion that engages said valve mechanism and a pivot that pivotally connects said valve actuating member with respect to said container and is located between said valve engaging portion and [said] hand-engageable portion[s] of said lever.

7. (Amended) The [A] hand-held pressurized product dispenser of claim 1,
[comprising

a container containing product under pressure, said container having a top, a hand-engageable body portion and a bottom,

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a valve mechanism at the top of said container that communicates with said container and is movable with respect to said container to cause pressurized discharge of said product out of said container, and

a valve actuating member that is connected to actuate said valve and has a hand-engageable portion that extends along said body,]

said valve actuati[ng]on [member] lever having a first cam member that is connected to said hand-engageable portion and faces said container,

said container carrying a second cam member that faces said first ca[n]m member,

said first and second cam members being oriented such that, as [said] a hand-engageable portion of said lever is moved toward said container, interaction of said first and second can surfaces causes said valve actuating member to move downward to actuate said valve mechanism.

8. (Amended) The [A] hand-held pressurized product dispenser of claim 1,
[comprising

a container containing product under pressure, said container having a top, a hand-engageable body portion and a bottom,

a valve mechanism at the top of said container that communicates with said container and is movable with respect to said container to cause pressurized discharge of said product out of said container, and

a valve actuating member that is connected to actuate said valve and has a hand-engageable portion that extends along said body,]

said container carrying a movable stop member facing [said] a hand-engageable portion of said lever so as to limit travel of said hand-engageable portion toward said container, said stop member having different portions that are selectively movable into position facing said hand-engageable portion so as to adjust movement of said valve actuating member.

10. (Amended) The dispenser of claim [1] 2 further comprising a product delivery member attached to said top of said container and having a product holding structure that is

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positioned with respect to said valve mechanism to receive said product, wherein said product holding structure has a generally flat upper surface.

11. (Amended) The dispenser of claim [1] 2 further comprising a product delivery member attached to said top of said container and having a product holding structure that is positioned with respect to said valve mechanism to receive said product, wherein said product holding structure has a generally arcuate upper surface.

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